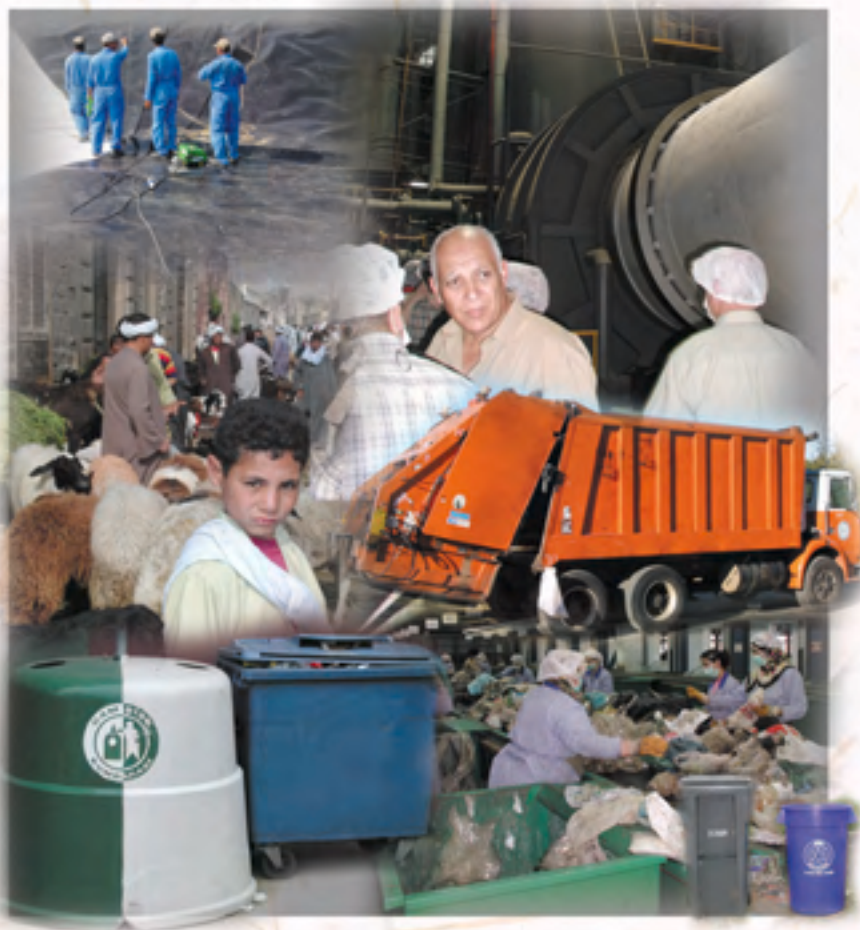


Solid Waste Management Privatization Procedural Manual

GLOSSARY



Ministry of State for Environmental Affairs



U.S. Agency for International Development



Egyptian Environmental Policy Program

INTRODUCTION

Numerous waste management terms and acronyms are used in the Solid Waste Management Privatization Procedural Manual. Other documents may use alternative terminology or alternative definitions, but the definitions herein provide the meaning intended by the authors.

ACRONYMS

ACM	Asbestos Containing Material
ADC	Alternative Daily Cover
ANSI	American National Standards Institute
AOR	Annual Operations Report
AW	Agricultural Waste
BOD	Biochemical Oxygen Demand
BOOT	Build, Own, Operate, and Transfer
BOT	Build, Operate, and Transfer
BTB	Building-to-Building
CAA	Competent Administrative Authorities
C&D	Construction and Demolition Debris
CMU	Contract Monitoring Unit
COD	Chemical Oxygen Demand
DOC	Drop-Off Center
DWP	Draft Work Plan
DTD	Door-to-Door
EIA	Environmental Impact Assessment
EEAA	Egyptian Environmental Affairs Agency
EEPP	Egyptian Environmental Policy Program
EMS	Environmental Management System
EPAP	Egyptian Pollution Abatement Project
EST	Environmentally Sound Technologies
EU	European Union
FCA	Full Cost Accounting
FML	Flexible Membrane Liner
FWP	Final Work Plan
GAM	Galvanized Steel After Manufacture
GCL	Geosynthetic Clay Liner
GOE	Government of Egypt
GOFI	General Organization for Industrialization
GVW	Gross Vehicle Weight
HCF	Health Care Facility
HDPE	High-Density Polyethylene
HHW	Household Hazardous Waste
HW	Hazardous Waste
ISO	International Organization for Standardization
ISWM	Integrated Solid Waste Management
IW	Industrial Waste
JV	Joint Venture
LCG	Large Commercial Generator
LEL	Lower Explosive Limit
LFG	Landfill Gas
MCP	Maximum Composting Potential
MoF	Minister of Finance
MoH	Minister of Housing (now Minister of Housing and Public Utilities)
MoHPU	Minister of Housing and Public Utilities
MoI	Minister of Irrigation (now Minister of Water Resources and Irrigation)
MoJ	Minister of Justice

MoMRA	Minister of Municipal and Rural Affairs
MOR	Monthly Operations Report
MoSEA	Minister of State for Environmental Affairs
MPR	Monthly Preparation Report
MRF	Material Recovery Facility
MRP	Maximum Recycling Potential
MSW	Municipal Solid Waste
MW	Medical Waste
NGO	Non-Governmental Organization
NIPPP	National Industrial Pollution Prevention Program
O&M	Operations and Maintenance
PACT	Public Awareness and Communication Team
PAYT	Pay As You Throw
PCB	Polychlorinated Biphenyls
PET	Polyethylene Terephthalate
PM	Prime Minister
PM-10	Particulate Matter
ppm	Parts per Million
ppb	Parts per Billion
PSP	Private Sector Participation
PWP	Preparation Work Plan
PVC	Polyvinyl Chloride
QA	Quality Assurance
QC	Quality Control
RDF	Refuse Derived Fuel
RFQ	Request for Qualifications
RFT	Request for Tender
SOQ	Statement of Qualifications
SSPF	Single Stream Processing Facility
SWM	Solid Waste Management
TCLP	Toxicity Characteristic Leaching Procedure
TEC	Tender Evaluation Committee
TO	Tender Offer
TPD	Tons per Day
TS	Transfer Station
TSP	Total Suspended Particulates
UEL	Upper Explosion Limit
UNEP	United Nations Environment Program
USAID	United States Agency for International Development
USEPA	United States Environmental Protection Agency
UV	Ultraviolet
WHO	World Health Organization
WPS	Waste Pooling Site
WTE	Waste-to-Energy
WWTP	Wastewater Treatment Plant

GLOSSARY

Acceptable Waste or Material: Any Solid Waste material that has been deemed suitable for handling or disposal at a Solid Waste Management Facility.

Accumulated Waste: Waste materials randomly discarded on the ground occupying more than 0.25 cubic meters in volume as a contiguous mass and therefore not considered to be part of Litter.

Aerated Static Pile Composting: A composting process where composting feedstock is placed in piles, usually elongated, and air is blown, or sucked, into the piles with a blower to optimize the environmental conditions that shorten the decomposition (composting) process time.

Aerobic Decomposition or Digestion: The decomposition of organic matter in the presence of oxygen. This is the type of waste degradation that takes place in an aerated compost pile where bacteria and other microorganisms in the presence of oxygen decompose Biodegradable Waste. Carbon dioxide and heat are released in the process. The remaining solid materials, known as Compost can be used as a soil amendment.

Agricultural Waste (AW): Crop residues and animal manures resulting from agricultural operations.

Airspace: The useable volume of a Landfill based on designed base and closure grades.

Alternative Daily Cover (ADC): Any material, other than soil, used to provide Daily or Initial Cover over freshly disposed waste at a Landfill. Alternative Daily Cover materials that have been used at Sanitary Landfills include mulch, chipped tires, inert fine-grained Industrial Waste, inert ash, tarps, and various commercial spray or foam products.

Anaerobic Decomposition or Digestion: The decomposition of organic matter in the absence of oxygen. This is the type of waste degradation that takes place in a Landfill where anaerobic bacteria in the absence of oxygen decompose Biodegradable Waste. Landfill Gas is released in the process and can be collected and used as a fuel. The remaining solid material is relatively inert and if excavated and aerobically processed may be able to be used as a soil amendment.

Animal Vector Management Plan: The Contractor's written plan to discourage the presence of animals at the Site, including rodents, birds, insects, livestock, and feral animals.

Applicable Law: Any law, rule, statute, regulation, instruction, resolution, order, judgment, directive, decree, policy, standard, treaty, code, manual, or other requirement having the force of law in Egypt, as they may be issued and in force from time to time.

ASTM: An organization responsible for development and publication of voluntary consensus standards for materials, products, systems, and services.

Bid Bond: A guaranty usually provided to a tendering agency by a bank or other guarantor, securing the value and term of a Bidder's bid or proposal. The amount guaranteed usually covers the government's cost of issuing the Request for Tender and processing the Tender Offer and possibly other damages.

Bidder: Any person, firm, or other entity that intends to submit a Tender Offer in response to a Request for Tender.

Bins: Receptacles used for collection and storage of waste at Waste Pooling Sites, Large Commercial Generators, construction sites, and industrial facilities that are compatible for mechanical dumping by rear loading collection vehicles.

Biodegradable (or Biologically Degradable) Waste: Organic Waste material capable of being degraded biologically by microorganisms and bacteria. Paper and paper products, wood, food, and plant materials are biodegradable; metals, glass, and most plastics are not.

Bioreactor Landfill: A Landfill where water is added and/or Leachate is recirculated in a controlled fashion in order to accelerate or enhance biological degradation of the waste.

Biosolids: See Sewage Sludge.

Biochemical Oxygen Demand (BOD): A unit of organic pollution as measured by its potential to deplete oxygen from a receiving water.

Build-Own-Operate-Transfer (BOOT): A privatization option whereby a government entity contracts with a Contractor to build, own, and operate a utility for a specified length of time. At the end of the contract period, the operator is required to transfer the assets of the utility back to the government, through sale or gift.

Build-Operate-Transfer (BOT): A privatization option whereby a government entity contracts with a Contractor to build and operate a utility on government provided land. At the end of the contract period, the operator transfers all assets to the government through sale or gift.

Building-to-Building (BTB) Collection: A waste collection technique where collection crews pick up waste from an entire building from one or more Rollout Carts or Bins at one location in or adjacent to the building, usually at street level.

Bulky Waste: Discarded items that are too large to fit in Suitable Containers, Rollout Carts, or Bins, including, but are not limited to: furniture and appliances, electronic products, automobile parts, trees, branches, stumps and palm fronds.

Cap: See Cover.

Capital Assets: Assets that have a useful life in excess of 1 year and are subject to depreciation. Examples include buildings, machinery, instrumentation, vehicles, furniture, electronics, and computers.

Capital Budgeting: The process of anticipating and planning for the outlay of future Capital Costs.

Capital Costs: Outlays for the purchase of Capital Assets.

Capture Rate: The percentage of the Recyclable material generated at a participating dwelling unit or business that the generator actually separates, stores, and sets out for collection.

Catch Basin: A reservoir designed to collect surface drainage or runoff. It typically is used to provide some level of water treatment (primarily settlement of particulates) prior to release to a surface water body.

Cell: A Cell is the basic structural unit by which a Landfill is developed. It is the general area where incoming waste is off-loaded from trucks, spread, compacted, and covered. A basic cell consists of a base of synthetic or soil Liner (or previously placed solid waste), compacted waste and a compacted Cover layer of soil.

Cleaner Production: A modification to an industrial production process whereby waste generation is reduced or eliminated.

Closure: The process of ceasing operations at a Solid Waste Management Facility and closing it in a manner to ensure future protection of human health and the environment.

Combustible Waste: Solid Waste that will burn such as waste paper, cardboard, wood, plastics, textiles, and leaves.

Commercial Waste: Solid Waste from businesses, office buildings, stores, markets, and institutional facilities.

Compaction: A landfill physical process by which the volume utilized by a unit amount of waste is reduced through an increase in density by compression using mobile equipment.

Compactors: Machines that reduce the volume of solid waste by crushing, compression, or compaction. A **landfill compactor** is a weighted vehicle equipped with a blade and cleated metal wheels that rolls over and compacts solid waste. A **compactor collection truck** uses a pneumatic ram to compact and push wastes into the main body of the truck. **Stationary compactors** often are used at Transfer Stations to compress and compact wastes into a container or bale.

Competent Authority: The decision maker in the administrative unit that is procuring the goods or services. Article 2 of the preamble to Ministry of Finance (MOF) Executive Regulations 1367/1998 defines “Competent Authority” as the minister, a person vested with the minister’s powers, the governor, or the chairperson of the public authority.

Composite Liner: A Landfill Liner that is comprised of a recompacted clay layer overlain by a Flexible Membrane Liner.

Compost: A humus-like material usable as a soil amendment in horticulture or agriculture to increase soil fertility, aeration and nutrient retention. Compost can be made from Biodegradable Waste.

Compostable: Any material that can be composted, or is designated as an Acceptable Waste or Material in a Composting program.

Composting: The process of converting organic material such as Agricultural Waste, Biodegradable Waste, Food Waste, Green Waste, Organic Waste, Yard Waste, and the organic fraction of other wastes such as Municipal Solid Waste and Construction and Demolition Debris to Compost through Aerobic or Anaerobic Decomposition. Composting usually takes place under aerobic conditions in an open pile or Windrow or in a tank or container (In-Vessel Composting).

Composting Facility: A facility used to convert waste to Compost.

Concession: A contracting mechanism where a government grants a Contractor the right to use a government resource such as solid waste. Typically the Contractor is granted exclusive rights in exchange for use of a resource and/or direct payment by the government for the service rendered. The contractor might use this waste to recover paper, plastic, metal, glass, or for energy generation. Usually associated with services that involve significant investment in facilities such as Sanitary Landfills, Transfer Stations, Material Recovery Facilities, etc.

Condensate: Liquids that condense from collected Landfill Gas due to cooling and/or pressure changes. Condensate is similar in composition to Leachate. Primarily aqueous, Condensate tends to have a larger organic fraction and smaller inorganic fraction than Leachate.

Consolidation Site: A designated site where collected Municipal Solid Waste, Bulky Waste, Construction and Demolition Debris, or Industrial Waste is received and consolidated into larger vehicles for transfer to a Transfer Station, or a waste processing, treatment, or disposal facility.

Constraint Mapping: Maps of a region under evaluation for siting of a new Solid Waste Management Facility presenting natural or constructed features that constrain the use of a particular site.

Construction and Demolition Debris (C&D): Solid Waste resulting from the construction, remodeling, repair, and/or demolition of structures, roads, sidewalks, and utilities; untreated wood and untreated sawdust from any source; motor vehicle window glass; and vegetation from land clearing and grubbing, utility maintenance, and seasonal or storm-related clean-up. Such wastes include, but are not limited to, bricks, concrete and other masonry materials, roofing materials, soil, rock, wood, wood products, wall or floor coverings, plaster, drywall, plumbing fixtures, electrical wiring, electrical components containing no hazardous materials, non-asbestos insulation and construction-related packaging. Construction and Demolition Debris does not include tires, drums, and containers even if such wastes resulted from construction and/or demolition activities.

Construction and Demolition Debris Landfill: A Landfill used expressly for the disposal of Construction and Demolition Debris. Because Construction and Demolition Debris typically is composed of materials that are relatively inert relative to Municipal Solid Waste, Construction and Demolition Debris Landfills may require fewer or less stringent environmental controls than a Sanitary Landfill.

Contract: A legally binding, written agreement between a governmental entity and a Contractor. Typically it defines the Service Area and binds both parties to requirements such as the services to be rendered by the Contractor, and the payments to be made by the governmental entity.

Contract Administrator: That person designated by the Governorate to manage the organization that is responsible for promulgating and protecting the interests of the Governorate in all aspects of Contract implementation and operation of Solid Waste Management and Cleaning Services as described in the Contract.

Contract Monitor: Designated representative of the Contract Administrator that has the responsibility for evaluating Contractor compliance with Service Specifications and Minimum Technical Requirements and Customer compliance with National Laws and Governorate ordinances pertaining to solid waste management and public cleaning.

Contract Monitoring Unit (CMU): A government unit responsible for monitoring the performance of a Contractor to establish compliance with Performance Standards.

Contract Signing Date: The date that the Contract is signed by the contracting agency and the contractor.

Contractor: Private company(s) or Joint Venture(s) with whom a government has negotiated and signed a contract for solid waste management services.

Corrective Action: Any action taken to investigate and cleanup contamination from a Solid Waste Management Facility.

Cover (or Cap): Material used to cover waste disposed in a Landfill. See Daily Cover, Alternative Daily Cover, Initial Cover, Intermediate Cover, and Final Cover.

Cress Test: A test procedure utilizing the germination rate of plants in finished compost products. Cress seeds are planted in one or more samples of the compost product and additional seeds are planted in a rich soil mix of peat moss. The germination rate and plant health is observed to determine the growth rates and the readiness (quality) of compost products.

Curb-Kilometer: Curbs located along one side of a street for a distance of 1 kilometer as measured by the contracting agency. Distances along median islands are not considered Curb-Kilometers.

Customer: Any person, business owner or representative, governmental or institutional organization in the Service Area that receives service as specified in the Contract.

Cytostatic Waste: Waste materials that can have a toxic effect on healthy cells. Cytostatic drugs are often used in cancer treatment. A Cytotoxic material is one which is harmful to cell structure and function, and which may ultimately cause cell death.

Daily Cover: Also called Initial Cover. Soil or other material (see Alternative Daily Cover) used to cover freshly disposed waste in a Landfill at the end of an operating day. In the case of Landfills that operate 24 hours per day, the Initial Cover typically is applied at some prescribed interval.

Debris: All materials normally picked up by a mechanical sweeper, such as sand, glass, paper, cans, rocks, leaves, and other materials.

Decision Committee: The committee responsible for reviewing and evaluating the technical portion of Tender Offers to identify those that are technically acceptable. The committee is chaired by a senior offi-

cial and is composed of members with relevant technical, legal, and financial expertise. After completion of the technical review, the Decision Committee also reviews the financial offers and makes its recommendation to the Competent Authority for award to the least-cost offer.

Depreciation: The annual cost attributable to the use of an asset for 1 year. Not the amount paid for the asset, but the amount needed to reduce its value over its useful life.

Designated Facility: A Sanitary Landfill, Transfer Station, Composting Facility, Material Recovery Facility, or any other waste facility designated to receive and/or handle wastes by the local governmental unit.

Dioxin: Dioxin refers to a group of chemical compounds that share certain similar chemical structures and biological impact characteristics. Studies have shown that exposure to Dioxin at high enough levels may cause a number of adverse health effects. Dioxin can be emitted when burning solid waste if there is incomplete combustion and inadequate air pollution control devices. Air quality standards for Waste-to-Energy or waste incineration facilities should include very stringent emission limits for Dioxin.

Direct Costs: Costs attributable to the principal activities of running a solid waste management operation, such as waste collection, transfer operations, landfill operations, recycling operations, etc.

Direct Haul: The hauling of collected solid waste in the collection vehicle from its point of collection to any solid waste processing or disposal, but not transfer facility.

Dirty MRF: See Mixed Waste Processing Facility.

Disposal: See Waste Disposal.

Diversion: See Waste Diversion.

Diversion Rate: The amount of waste diverted from disposal facilities through resource recovery and recycling.

Domestic Waste: See Residential Waste.

Door-to-Door (DTD) Collection: A waste collection technique where crews collect Municipal Solid Waste and Bulky Waste placed in or beside Suitable Containers placed outside of the individual residence or business door by the occupants.

Down-Gradient: A location that is at a lower elevation or, from a hydrogeological perspective, a location in groundwater that is receiving flow from a location that is the point of potential origin of contaminants.

Draft Work Plan (DWP): The document prescribed in the RFT that the contractor must submit as part of his tender offer providing details of the activities that he will undertake a, and the methodologies that he will use in the preparation, implementation and provision of each type of service requested in this RFT.

Drainage Geocomposite: Formed by heat-bonding (typical) non-woven Geotextile to one or both sides of a Geonet to create a drainage composite material, which can be placed in direct contact with soil or stone backfill without significantly reducing the in-plane hydraulic flow capacity of the Geonet.

Drop-Off Center (DOC): A method of collecting recyclable or compostable waste materials in which the materials are taken by individuals to collection sites and deposited in designated containers.

Dry Material Recovery Facility (DMRF): A facility where recyclable materials are sorted and processed for sale from the dry (non-organic) portion of Solid Waste separated from the wet portion by the generator and collected separately.

Dumpster: A common term used to describe storage bins (containers), typically 1 cubic meter or larger, for commercial, institutional, and industrial solid waste.

Dwelling Unit: The physical domicile of an individual family or families; typically one or more rooms that together comprise a single-family dwelling unit or household, or with other Dwelling Units comprise a Multi-Family Building.

Ecotoxic: A chemical substance with the capability to have deleterious effects on animals, plants, fish, invertebrates, microorganisms, and the surrounding ecosystem.

Electronic or E-Waste: Discarded electronic equipment including computers, monitors, printers, televisions, stereo systems and videocassette recorders.

End-user: The user of a diverted material or product which has been returned to the economic mainstream, whether or not the return is through sale of the material or product.

Energy Recovery: The recovery of energy from waste by burning it and using the heat to produce steam for direct use or for the generation of electricity, or the use of Landfill Gas as a fuel, or various chemical, thermal and biological processes that convert Solid Waste into liquid or gaseous fuels.

Enterprise Fund: A self-supporting method of funding operations through revenues generated from charges and fees for various services.

Entire Contents: All of the MSW in a Rollout Cart or Bin that is loose and will transfer by gravity into the hopper of a Waste Collection Vehicle when it is raised to its' full dumping position.

Environmental Impact Assessment (EIA): A document required by Egyptian Law that identifies and analyzes in detail the environmental impacts of a proposed action. Most Solid Waste Management Facilities in Egypt require the preparation of an Environmental Impact Assessment, and its approval by the Egyptian Environmental Affairs Agency, prior to construction.

Environmental Justice: Refers to the fair distribution of environmental risks across socioeconomic and racial groups. From a solid waste perspective, environmental justice concerns arise when waste management facilities are perceived to be located predominantly in areas with minority or lower income populations.

Ergonomic Injuries: Injuries that affect the musculoskeletal system. There are a number of Ergonomic Injuries that can occur from jobs that involve repetitive motion, heavy lifting, forceful exertion, contact stress, vibration, awkward posture, and rapid hand and wrist movement. Solid waste managers should put in place training programs and workplace controls to reduce Ergonomic Injuries.

Explosimeter: A portable meter used to test or monitor for the presence of explosive gases.

Field Supervisor: The person(s) designated by the Contractor to be present in the field to coordinate and oversee the activities of all types of work crews.

Final Cover (or Cap): Layers of impermeable materials installed over the top of a closed landfill to minimize the infiltration of rainwater and the production of Leachate.

Final Work Plan (FWP): The document prescribed in the RFT requiring the contractor to submit to the contracting agency in writing, and for its approval, details of the activities that the contractor will undertake in the preparation, implementation, and provision of each type of service.

Financial Assurance: A financial accrual method designed to ensure that Solid Waste Management Facility owners will have the financial resources to pay for closure, post-closure, and corrective action costs.

Flat Rate Tariff: A single rate charged waste producers, regardless of the amount of waste set out for collection.

Flexible Membrane Liner (FML): See Geomembrane.

Flow Control: Refers to a situation where waste collectors are required or provided incentives to take collected Solid Waste to a Sanitary Landfill, Transfer Station, Material Recovery Facility, or other Solid Waste Management Facility that has been designated by local government officials. Flow Control can be implemented in several different ways: through local ordinances, through requirements placed in contracts or Franchises for collection services or as economic flow control where a local government creates economic incentives to take wastes to a Designated Facility.

Food Waste: Animal and vegetable materials resulting from the processing, handling, and/or preparation of foods.

Franchise: A contracting mechanism where a government grants a single private sector company the right to provide services within a defined area. Typically, the private firm contractually agrees to provide specific services in exchange for the right to charge customers directly for those services. The government retains some control over the tariffs charged by the Contractor to the customers and also provides quality oversight of the Contractor's work.

Full Cost Accounting (FCA): A systematic approach for identifying, summing, and reporting the actual costs of solid waste management. It takes into account past and future outlays, overhead (oversight and support service) costs, and operating costs.

Garbage: Food Waste, as from a kitchen, Refuse, Trash. A generic term for, and component of, Solid Waste.

Generator: See Waste Generator.

Genotoxic Waste: Waste that contains genotoxic materials. Genotoxic materials are those capable of causing damage to DNA.

Geogrid: Large aperture Geosynthetic used primarily for soil or stone reinforcing. Geogrids typically exhibit high planar tensile strength, and the ability to impart the planar tensile strength of the Geogrid into the surrounding soil or stone backfill. Applications include slope reinforcing, roadway base reinforcement and subgrade improvement (for both paved and unpaved applications).

Geomembrane (or Flexible Membrane Liner): Plastic sheeting (commonly polyethylene, polyvinyl chloride or chlorosulfonated polyethylene) which is heat-fused or glued together to form an impermeable barrier. Applications include landfill bottom liner and final covers, pond or impoundment liners, and seepage barriers in foundations and below-grade walls.

Geonet: Geosynthetic manufactured of extruded polymetric ribs to form a net-like sheeting which has a high in-plane hydraulic flow capacity. Applications include landfill Leachate collection systems, leak detection systems, and final cover underdrains; underdrains for structures and roadways; and vertical drains for building foundations and below-grade walls.

Geosynthetic: Man-made materials used in environmental, geotechnical, and civil engineering applications. Geosynthetics include Geomembranes, Geotextiles, Geonets, Geogrids, and other synthetics used to prevent or promote seepage or drainage, slope reinforcing, and fill stabilization or reinforcement.

Geosynthetic Clay Liner (GCL): Synthetic clay barrier material formed by: (1) adhering granular bentonite to one side of a Geomembrane material, or (2) by sandwiching granular bentonite between two sheets of Geotextile (both woven and non-woven used). For sandwiched products, reinforcing can be provided by polymetric thread stitched between Geotextile layers. Applications include landfill bottom liner and covers, and pond and impoundment liners.

Geotextile (Non-woven): Non-oriented polypropylene or polyester fibers formed into a sheet material by heat or other mechanical processes. Non-woven Geotextiles typically exhibit high cross-plane hydraulic flow capacity, and medium to low in-plane tensile strength. Applications include materials separation and drainage applications.

Geotextile (Woven): Polypropylene or polyester stands woven to create a fabric with medium to high in-plane tensile strength. Unlike non-woven Geotextiles, woven Geotextiles have low in-plane hydraulic flow capacity, and cross-plane hydraulic flow capacity that can range from fair to poor. Applications include reinforcing applications, materials separation, and limited drainage applications.

Green Waste: Grass clippings, shrub and tree cuttings, and other wastes resulting from landscape care and gardening.

Groundwater: Water under the surface of the earth that is present in or flowing through soil or bedrock.

Groundwater Monitoring: Refers to the sampling and analysis of groundwater for the purpose of detecting groundwater contamination from a Solid Waste Management Facility.

Hand Carts: The mobile multi-wheeled piece of equipment used by Manual Sweepers to carry tools and containers for storage of Street Sweepings and Litter that they collect.

Hazardous Waste (HW): Hazardous wastes are wastes with properties that make them dangerous or capable of having a harmful effect on human health and the environment. Under Egyptian Law, Hazardous Waste is specifically defined as wastes that exhibit one or more of the following specific characteristics: toxicity, flammability, ignitability, and/or infectious.

Health Care Facility (HCF): Businesses, professionals, and/or institutions directly providing health care for humans or animals, or engaged in medical research. Such facilities may include, but are not limited to: hospitals, health care centers, clinics, family planning units, first aid or emergency response units, veterinary hospitals or clinics, medical laboratories, doctor's offices, dental clinics and offices, and medical research facilities.

Health Care Waste: All wastes generated by a Health Care Facility including Municipal Solid Waste and Medical Waste. See Medical Waste.

Heavy Metals: A metal with a specific gravity greater than about 5.0, especially one that is poisonous, such as lead, chromium, or mercury. Sometimes found in trace concentrations in emissions from waste Incinerators, Waste-to-Energy Facilities, or in Leachate.

High-Density Polyethylene (HDPE): A Recyclable plastic used to make a variety of products including beverage containers, piping, and liners. Often used in Sanitary Landfill Liners and in Landfill Gas and Leachate collection systems. Some HDPE containers can be identified by the number 2 stamp inside the recycling arrows on the container.

Household Hazardous Waste (HHW): Wastes from homes and residences that have properties that make them dangerous or capable of having a harmful effect on human health and the environment.

Household Waste: Solid waste originating from homes and residences. Also called Residential Waste or Domestic Waste.

Hydraulic Conductivity: A measure of the ability of water to flow through any material.

Hydrogeological: A reference pertaining to the study of groundwater and its environment.

Impermeable: The property of a liner or soil condition that does not allow liquid to flow through it.

Incineration: The controlled combustion of solid, liquid, or gaseous combustible wastes resulting in the formation of gases and residual waste containing little combustible material.

Incinerator: An enclosed device for controlled combustion of waste. There are several different types of Incinerators. **Mass Burn Units** burn mixed Solid Waste with little or no prior separation. **Refuse Derived Fuel (RDF)** units separate Combustible Waste from noncombustible wastes prior to combustion.

Incinerator Ash: The noncombustible residue remaining after the incineration of solid waste. **Bottom ash** is ash that falls to the bottom of the combustion chamber and is removed mechanically. **Fly ash** is particles of ash that are entrained in the exhaust gases during combustion solid wastes in an Incinerator. In modern Incinerators fly ash particles are removed from the combustion gases prior to exhaust to the atmosphere.

Incinerator Ash Landfill: A Landfill used expressly for the disposal of Incinerator Ash. Because Incinerator Ash typically is not decomposable, Incinerator Ash Landfills may require fewer or less stringent environmental controls than a Sanitary Landfill, particularly in regard to Landfill Gas control. Groundwater Monitoring and Leachate control measures are advised for Incinerator Ash Landfills.

Indirect Costs: Costs incurred in support of principal activities. Examples of these expenses are accounting costs, clerical staff, payroll services, data processing, insurance, etc. Many of these kinds of costs are referred to as “Overhead”.

Industrial Waste (IW): Solid Waste generated from industrial establishments. Industrial Waste does not include sludges, liquids, Hazardous Wastes, Radiological Waste, Medical Waste, Agricultural Waste, or Construction and Demolition Debris.

Industrial Waste Landfill: A Landfill used expressly for the disposal of Industrial Waste usually accepting Industrial Waste from one industrial facility or one industry. In cases where the waste disposed is less decomposable than Municipal Solid Waste, Industrial Waste Landfills may require fewer or less stringent environmental controls than a Sanitary Landfill.

Inert Waste: Any waste material that is non-decomposable and unlikely to leach.

Inert Waste Landfill: A Landfill used expressly for the disposal of Inert Waste. Inert Waste Landfills typically require fewer or less stringent environmental controls than a Sanitary Landfill.

Infectious Waste: See Medical Waste.

Initial Cover: See Daily Cover.

Institutional Waste: Solid Waste originating from schools, universities, hospitals and other institutions.

Integrated Solid Waste Management (ISWM): A systematic approach to the management of Solid Waste that combines and integrates Source Reduction, Reuse, Recycling, Composting, Energy Recovery, and Landfilling in order to conserve and recover resources and dispose of Solid Waste in a manner that protects human health and the environment. See Solid Waste Management.

Intermediate Cover: A cover, typically soil, used over filled areas of a landfill that will not receive additional waste for a long period of time but will receive additional waste in the future, to minimize the infiltration of rainwater and the production of Leachate.

In-Vessel Composting: A composting process where organic feedstock is placed in a vessel to facilitate the natural decomposition process. The vessel may consist of vertical or horizontal tanks or drums, large bags or other type of container. The composting process is aided through mixing, addition of water and/or air to increase the decomposition (composting) rate inside the vessel.

Joint Venture (JV): An association or a combination of companies legally joined together by an agreement forming a joint stock company to perform a Contract according to its terms and conditions.

Landfill: A waste disposal facility used for the disposal of waste to land. Includes Sanitary Landfills, Construction and Demolition Debris Landfills, Inert Waste Landfills, Industrial Waste Landfills, and Incinerator Waste Landfills.

Landfill Capacity: A measure of the total volume within a landfill that is available for the placement of waste.

Landfill Gas (LFG): Gas generated by the Anaerobic Decomposition of waste in a Landfill. Landfill Gas is approximately 50 percent methane, the primary component of natural gas, and 50 percent carbon dioxide, and may contain hundreds of other compounds, usually in trace concentrations. Landfill Gas can be collected and used as a fuel for heating or generating electricity.

Landfill Gas Migration: The movement of Landfill Gas through Landfill Liners and subsurface soils as a result of the relief of gas pressure through flow paths of least resistance.

Large Commercial Generator (LCG): Generators of Municipal Solid Waste and Bulky Waste including, but not limited to hi-rise apartment buildings, hotels, restaurants, office buildings, government offices, supermarkets, and large retail stores that generate more than 1 cubic meter of Solid Waste per day.

Leach: To remove soluble or other constituents by the action of a percolating liquid.

Leachate: All surface or groundwater that comes in contact with or is contaminated by waste in a Solid Waste Management Facility. Primarily aqueous, Leachate does contain organic and inorganic contaminants.

Leachate Head: A buildup of Leachate levels over a Landfill Liner that could increase the potential of leakage.

Lift: A completed layer of compacted waste Cells. Once a completed layer of Cells is constructed, a second layer of waste is then spread over the first and subsequently compacted.

Liner: A layer of natural or synthetic material, beneath and on the sides of a Landfill that restricts the downward or lateral escape of Leachate and Landfill Gas. **Clay Liners** can be constructed from tightly compacted clay soils. **Synthetic Liners** are constructed from plastic membranes (Geomembranes). **Composite Liners** combine layers of both synthetic membranes and compacted clay components.

Litter: All randomly discarded solid waste materials found on streets and other public areas.

Litter Basket: Receptacles freestanding (fixed) to the sidewalk or mounted on street light poles for the specific purpose of accommodating solid waste materials discarded by the public in public areas.

Litter Basket Service: The procurement, distribution, servicing (emptying contents), sanitizing and maintaining litter baskets along designated streets and in public areas.

Lower Explosive Limit (LEL): The minimum concentration of a combustible or explosive gas in air that can cause a fire or explosion as a result of contact with an ignition source.

Managed Competition: A process where public sector solid waste departments are allowed to submit proposals or bids in competition with private sector solid waste companies in response to a publicly tendered Service Contract. Managed Competition could be applied to any solid waste service (or any other municipal service) but generally has been applied to solid waste collection services.

Management Contract: A contracting mechanism where a company assumes responsibility for the management of most or all of the public utility's activities such as Operations and Maintenance (O&M), billing and collections, and/or day-to-day service operations.

Manual Sweeper: Employees of the contractor that are equipped with hand carts, tools, and safety equipment to manually sweep primary, secondary, and unpaved streets as well as public facilities designated by the contracting agency.

Manual Sweeping Service: Sweeping and removal of all litter and debris from primary, secondary, and unpaved streets through the use of manual sweepers.

Material Recovery Facility (MRF): A facility where recyclable materials are sorted from collected Solid Waste and processed for sale to various markets.

Maximum Composting Potential (MCP): The annual tonnage of Compostable materials in the planning area that can realistically be separated, collected, and processed for Composting.

Maximum Recycling Potential (MRP): The annual tonnage of recyclable materials in the planning area that can realistically be separated, collected, and processed for recycling.

Mechanical Street Sweeper: A heavy-duty vehicle used for the express purpose of removing all material including Debris and Litter from paved surfaces, by mechanical means through the action of one or more brooms, or by suction through a vacuum or regenerative air system or any combination of the above.

Mechanical Sweeping Service: The mechanical washing, sweeping and removal of all Litter and Debris along all Curb-Kilometers from primary streets including the paved area between the normal curb lines of a roadway, whether actual curb lines exist or not, including Median Islands, but not including traffic islands, sidewalks, areas adjacent to the street, or parking lots.

Median Islands: A dividing area, normally at curb height, between opposing directions of traffic not normally located along secondary streets.

Medical Waste (MW): Any potentially infectious waste generated in the diagnosis, treatment, or immunization of human beings or animals, or in research pertaining thereto, or in the production or testing of biologicals. Medical Waste includes cultures and stocks, human pathological wastes, human blood and blood products, sharps, isolation wastes, and unused sharps. This term does not include Toxic Waste, Hazardous Waste, or Radiological Waste. Also referred to as Pathological Waste or Infectious Waste.

Minimum Technical Requirements: Sections of the Request for Tender technical documents that are written to set conditions relating to “how” the Contractor shall perform the specified services. In other words, Minimum Technical Requirements establish guidelines that will ensure that the Contractor provides the services in a manner that is compatible with each of the systems design goals.

Mixed Waste Processing Facility (MWPF): A Material Recovery Facility where Recyclables are separated from an incoming co-mingled Municipal Solid Waste stream. Also known as a Dirty MRF.

Monthly Preparation Report (MPR): The document that the contractor must submit at the end of each month during the preparation period describing in detail the progress of the work and any potential impediments to satisfactory implementation in the specified time period.

Monthly Operations Report (MOR): The document that the contractor must submit at the end of each month during the operations period that includes detailed information concerning the performance of each type of residential and commercial waste collection service.

Municipal Solid Waste (MSW): Residential, commercial, governmental, and institutional wastes, and wastes with similar chemical and physical characteristics from other sources. Municipal Solid Waste includes, but is not limited to: Garbage, Refuse, and other discarded materials. It does not include Hazardous Waste, Radiological Waste, Medical Waste, Industrial Waste, liquids, Agricultural Waste, or Construction and Demolition Debris.

Municipal Solid Waste Landfill: See Sanitary Landfill.

Mutagenic: A mutagenic agent is one which is capable of causing mutations. It may also (but does not necessarily) act as a carcinogen.

Natural Attenuation: The natural chemical, biological, and physical treatment processes that are imparted to water flowing through soil.

Nestability: The ability of Roll-out Carts or Bins to be stacked inside each other for the purpose of saving space and reducing shipment and distribution costs.

Non-Governmental Organization (NGO): A private organization, usually non-profit, established to represent the interests of an informal sector group or process.

Open Competition: A system of solid waste management that allows each household, commercial establishment, or industrial, institutional, or medical facility to hire a Contractor of its choice for waste collection services. Each customer then pays the Contractor for the services provided.

Operations and Maintenance (O&M): The recurring costs of running an operation. Includes direct and indirect costs of labor, fuel, maintenance, accounting, etc.

Operations Period: The period following the Preparation Period in which the Contractor performs Waste Management and/or Cleaning Services.

Organic Waste: Waste materials, containing carbon compounds that are capable of being degraded biologically into a relatively inert material. Paper wastes, Food Waste, wood wastes, Green Waste, Yard Waste, and most Agricultural Wastes are Organic Wastes. Metals and glass are not. Plastics contain carbon compounds and are theoretically organic in nature but most plastic wastes are not readily biodegradable.

Overhead: See Indirect Costs.

pH: The symbol used in expressing the acidity or alkalinity of a substance. It is described as number ranging from 1 to 14. A substance with a pH of 7 is considered neutral whereas a number higher than 7 indicates increasing alkalinity and a number under 7 indicates increasing acidity.

Participation Rate: The percentage of dwelling units or businesses that actually “participate”, i.e. adopt the required behavior, in a recycling program in any given time period (usually at least once a month) by setting out material as requested.

Particulate Matter (PM-10): Particulate matter is the term for solid or liquid particles found in the air. PM-10 refers to particles with a diameter of 10 micrometers or less. These small particles are of concern because of their ability to reach the lower regions of the respiratory tract. Major concerns for human health from exposure to PM-10 include: effects on breathing and respiratory systems, damage to lung tissue, cancer, and premature death. The elderly, children, and people with chronic lung disease, influenza, or asthma, are especially sensitive to the effects of Particulate Matter.

Passive/Static Pile Composting: A composting process where composting feedstock is placed in a pile, usually elongated, and the material is left to decompose (compost) with little, or no, mixing of the materials during the composting process.

Pathological Waste: See Medical Waste.

Pay As You Throw (PAYT): Charge and fee systems where waste generators are charged for waste collection, handling, processing, recycling, and/or disposal based on the volume or weight of the solid waste collected. The purpose is to provide an economic incentive to reduce waste generation or to separate waste materials at the source for recycling.

Performance Bond: A guaranty usually provided to the contracting agency by a bank or other guarantor, securing the performance of the Contractor. The amount guaranteed usually equals a percentage of the annual contract value, as agreed to by the government and the Contractor.

Performance Standards: Parameters for performance that the Contractor will be required to meet in the provision of services as described throughout the contract documents.

Permeability: The capability of any material to allow water or air movement through it. The quality of the material that enables water to move downward through the profile, measured as the number of centimeters per second (cm/sec) that water moves downward through it. See Hydraulic Conductivity.

Planning Area: The geographic area for which Solid Waste Management and Cleaning Service plans are developed and implemented under the direction of the Planning Team.

Planning Team: The group established by the local government or Governorate charged with assessing

an existing solid waste management system and proposing a new system or changes to the existing system through the development of a Solid Waste Management Plan.

Polyethylene Terephthalate (PET): A Recyclable plastic commonly used to make plastic soft drink bottles and other containers and products. Some PET containers can be identified by the number 1 stamp inside the recycling arrows stamped on the container.

Point of Collection: The place where the generator places recyclables or solid waste and the point where the collection service provider collects waste or recyclables from.

Post-Closure: A period of time after closure of a Landfill during which work may be required to continue certain landfill tasks such as environmental monitoring and Leachate and Landfill Gas control.

Post-Closure Care: Activities during the period after Closure of a Solid Waste Disposal Facility where the facility owner is required to carry out monitoring, maintenance, and Corrective Action as required in order contain disposed waste materials and to detect, prevent, or respond to the release of waste materials, Leachate, or Landfill Gas.

Preparation Period: The period beginning with the signing of the Contract and ending with the start of the Operations Period in which the Contractor must procure, mobilize, and deploy manpower and equipment resources.

Preparation Work Plan (PWP): The document prescribed in the RFT requiring the Contractor to submit to the contracting agency in writing, and for its approval, details and the schedule for completion of the activities that he will undertake during the Preparation Period.

Pre-Qualified Bidder: A Bidder who has been pre-qualified through the Request for Qualifications process and will be allowed to submit a Tender Offer in response to the Request for Tender.

Private Sector Participation (PSP): Participation of a private sector company(ies) in the management of a publicly-owned enterprise or a public utility service. Can take the form of a Service Contract, Management Contract, Franchise Agreement, Concession, or an Open Competition system.

Privatization: To change an industry or business from governmental or public ownership or control to private enterprise through either the complete divestiture of public assets (sale of assets to a private entity) or the participation of the private sector in a public service. See Private Sector Participation. Privatization can take several different forms including complete private ownership and operation, contracts or agreements with private entities to provide services, or contract operation of facilities or equipment owned by the public sector.

Processing Facility: Any facility approved for sorting, converting, or recovering materials from Solid Waste for beneficial use. Processing Facilities include Composting Facilities and Material Recovery Facilities.

Product Stewardship: Product stewardship is a product-centered approach that calls on all those in the product life cycle including manufacturers, retailers, users, and waste managers; to share responsibility and costs for reducing the adverse environmental impacts of products. From a Solid Waste Management perspective, product stewardship involves the actions taken to improve the design and manufacture of products to facilitate their Reuse, Recycling, or Disposal, as well as actions to establish programs to collect, process, and Reuse, or Recycle products when they are discarded.

Products of Combustion: The gases and particulates that result from the combustion of waste.

Program Administrator: See Contract Administrator.

Project Administrator: See Contract Administrator.

Public Awareness and Communications: A process for drawing the public's attention to certain public

issues or problem areas and bringing about behavior and social change by ensuring that the public understands the new system and convincing them it is in their best interest to cooperate.

Public Awareness and Communications Team (PACT): The group established by the local government or Governorate charged with developing, implementing, and managing a public awareness campaign.

Public Facility: Means open general commercial markets, commercial areas, major places of worship, parks, gardens, squares, train stations and bus stops, and any other site that is listed by the contracting agency for Litter Collection Service.

Public Structure: Public structures can include, but are not necessarily limited to: fountains, memorials and statues; bridges, including abutments, columns, curbstone, and guardrails; tunnels; bus and tram stations; elevated roadways and pedestrian crosswalks; traffic lights; street light poles and lamps, traffic control and street signs; advertising signs located in the public right-of way; traffic control shelters, and any other site that is listed by the contracting agency for Public Structure Washing Service.

Public Structure Washing Service: High pressure washing and rinsing of Public Structures using hot water and a specified cleaning agent.

Pyrolysis: The thermal and chemical decomposition of Organic Waste in a furnace operated without sufficient oxygen to allow combustion. The products resulting from pyrolysis can be combustible gases, oils, charcoal, and mineral matter.

Quality Assurance (QA)/Quality Control (QC): A highly controlled set of procedures through which Liner, Cover, or other installation processes are monitored and controlled so that the delivered services or derived products are of a specified characteristic. Quality Control (QC) normally is provided by the installing contractor. Quality Assurance (QA) normally is provided by an independent contractor hired specifically to monitor the installing contractor's work.

Radiological Waste: Any waste that has been exposed to, or comes in contact with, a radioactive material.

Rail Haul: The transport of waste (generally long distances) by railroad.

Recirculation: The process of collecting Leachate and/or Condensate generated at a Landfill and applying it back to the disposed waste. Recirculation can speed up the decomposition process in a Landfill and provide treatment of the organic fraction of both Leachate and Condensate. Bioreactor Landfills use Recirculation, sometimes along with added water, to accelerate or enhance biological degradation of the waste.

Recyclables or Recyclable Materials: Materials that still have physical or chemical properties after serving their original purpose and that can, therefore, be reused or remanufactured into additional products. Waste materials that are collected, separated, and used as raw material.

Recycled Material: A material separated from Solid Waste that has been processed and recovered as a usable product or material.

Recycling: The process by which waste materials are transformed into new products in such a manner that the original products lose their identity. It also includes the collection, transportation, or storage of products by other than the original user or consumer, giving rise to the product being in the stream of commerce for collection, disposal, recycling, resource recovery, or utilization.

Recycling Bin: A container in which to place recyclable materials for collection.

Red-Bag Waste: A name given to infectious Medical Waste referring to the standard red bags used for collection of Medical Waste.

Refuse: Items or material discarded or rejected as useless or worthless; Trash or Rubbish. A generic term for, and component of, Solid Waste.

Regrind: A plastic product or scrap that has been reclaimed by shredding and granulating for reuse.

Request for Qualifications (RFQ): A formal request for companies interested in bidding on a contract to submit their qualifications to perform the work specified.

Request for Tender (RFT): A formal request for Tender Offers for the provision of services by Contractors in the form of documents prepared by a government containing general information, technical specifications, draft contract language, and other information necessary for a Bidder to make a formal Tender Offer for the services desired.

Residuals: The fraction of materials received at Designated Processing Facilities that is not diverted to beneficial use. Or the remains of a treated waste, such as Treated Medical Waste Residue.

Resource Recovery: A general term used to describe the recovery of materials or energy from Solid Waste. Resource recovery encompasses Reuse, Recycling, Composting, and Energy Recovery.

Respondent: A Bidder who responds to a Request for Tender.

Reuse: The use of a product more than once in its same form for the same or different purpose. Examples include refilling beverage bottles that have been returned to a bottling company or using scrap tires as dock bumpers.

Rigid Plastic Container: A container not exceeding 40 liters in capacity constructed of plastic and designed for the sole purpose of storing municipal solid waste.

Rollout Carts: Waste containers used in Building-to-Building and Large Commercial Generator waste collection services. Rollout Carts generally have 250 to 500 liters of capacity, are mounted on two wheels, and are compatible with hydraulic dumping mechanisms mounted on Waste Collection Vehicles.

Rubbish: Refuse or Garbage or other worthless material. A generic term for, and component of, Solid Waste.

Sanitary Landfill: An engineered facility used for disposing wastes to land in a manner that minimizes adverse human health and safety and environmental impacts resulting from the wastes or their products of decomposition. Sanitary Landfills typically are used for disposal of Municipal Solid Waste and other types of non-hazardous Solid Waste.

Scalehouse: A permanent structure located inside any solid waste facility main vehicle entrance equipped with truck platform scales and electronic transmitters and computers to record vehicle tare and net weights.

Sedimentation: The process by which water born solid materials are allowed to be settle in a controlled structure.

Service Alternative: The desired type(s) of waste service, customer base, service level, and service frequency identified by the Planning Team for evaluation during the Solid Waste Planning process.

Service Area: The geographic area or region in which Solid Waste Management and Cleaning Services are to be provided.

Service Contract: A short- or long-term Contract to provide a specific scope of work. Service Contracts for solid waste management might consist of tasks with a limited scope such as providing trash vehicle maintenance or repairing waste containers, or more complex and comprehensive services such as complete waste collection and disposal. Service Contracts can provide for public sector access to private sector expertise.

Service Failure: Any failure to provide any type of waste collection service at the frequency prescribed in the Service Specifications.

Service Recipient: See Customer.

Service Specifications: Sections of the Request for Tender technical documents that are written to provide Bidders with a clear understanding of what services the Contractor is to provide. The Service Specifications tell the potential Contractor what, where, and when.

Set-out: Waste or segregated recyclables placed outside a residence or establishment for collection.

Set-out Rate: The percentage of all eligible Dwelling Units or businesses that actually set out recyclable materials on any given collection day.

Sewage Sludge: A solid, semisolid, or liquid waste generated from a municipal wastewater treatment plant. Biosolids is another term for sewage sludge.

Sharps: Medical Waste consisting of hypodermic needles; hypodermic syringes with attached needles; scalpel blades; razor blades, disposable razors, and disposable scissors used in a medical procedure; intravenous stylets and rigid introducers; and glass Pasteur pipettes, glass pipettes, specimen tubes, blood culture bottles, and microscope slides; broken glass from laboratories, and any other item that might puncture, cut, or pierce the skin.

Single Stream Processing Facility (SSPF): A Material Recovery Facility that processes in one stream all targeted recyclable materials collected from residents or businesses in a formal recycling program.

Siting Criteria: The basis by which the merits of a location can be evaluated for its' suitability for development of a Landfill or other Solid Waste Management Facility.

Solid Waste: Municipal Solid Waste (MSW), non-hazardous Industrial Waste, Medical Waste, Construction and Demolition Waste, and Street Sweeping and Public Facility Cleaning residues as defined in the Glossary. For the purposes of this manual, solid waste does not include Hazardous Waste, Radiological Waste, Agricultural Waste, liquid waste, or sludges.

Solid Waste Disposal Facility: Any facility used for the disposal of Solid Waste or residues from the processing or incineration of Solid Waste.

Solid Waste Management (SWM): A term used to describe the planned and organized management of Solid Waste in an environmentally and economically sound manner. Solid Waste Management encompasses management of the generation, storage, collection, transfer, transportation, processing, reuse, recycling, incineration, energy recovery, and landfilling of solid waste. It includes all administrative, financial, educational, environmental, legal, planning, marketing, and operational aspects of the management of Solid Waste.

Solid Waste Management Facility: Any facility used for the collection, storage, transfer, processing, composting, recycling, incineration, energy recovery from, or disposal of Solid Waste.

Solid Waste Management Plan: A document prepared by the Planning Team and approved by the local government or Governorate that describes the desired Service Alternative and the desired method(s) for delivery of the waste management services within a specific Service Area. The plan should include a description of how the services will be paid for, as well as layout the steps to implement the plan.

Source Reduction: Actions taken to reduce the quantity or toxicity of wastes that are produced. Source reduction is accomplished by redesigning products so that less waste or less toxic wastes are produced when the product is discarded or by reducing consumption of certain products that become wastes. See Waste Reduction.

Source Separation: Sorting and separating various waste materials from each other by the waste generator so these materials can be separately collected for recycling or composting. Examples include separating out newspapers, glass bottles, metal cans, plastic containers, corrugated cardboard, office papers, and/or lawn and garden wastes.

Special Waste: Solid Wastes that are often separated from mixed municipal wastes for special handling

or management. Special wastes include Household Hazardous Waste, tires, batteries, discarded pesticides, discarded Electronic Waste, and Bulky Waste.

Stakeholder: Any individual, group, or entity with an interest in a process or venture.

Statement of Qualifications (SOQ): The response to a Request for Qualifications prepared by the Respondent that gives the contracting entity sufficient information to decide if the Respondent will be pre-qualified to receive and respond to the Request for Tender. Typically the Request for Qualifications will specify the form and content of the information to be provided by the Respondent in the Statement of Qualifications.

Stormwater: Water resulting from storm or rainfall events.

Street Cleaning Equipment: A mobile piece of equipment, motorized or not, used by the Contractor for the purpose of washing, sweeping, and removing Litter and Debris from designated places.

Street Sweepings : Accumulated waste materials generated as the result of performing Mechanical and Manual Street Sweeping Services, including, but not limited to deposits of loose dirt, dust, rocks, glass, cans, bottles, leaves, branches, papers, or any similar material that can be removed by Street Cleaning operations.

Suitable Container: The waste container used for storage and Set-out of Municipal Solid Waste for Door-to-Door collection service. The container usually is a plastic bag or a rigid container with a lid capable of holding no more than 25 kilograms of waste.

Surface Water: Water that is flowing over the surface of the ground as a result of rainfall or concentrated flow from upland locations.

Surge Pit: A recessed area in a transfer station that performs the function of accepting and storing solid waste from waste collection vehicles.

Tariff: A rate charged to waste producers to recover the costs of providing solid waste management services. Also referred to as “Fees”.

Technical Committee: See Tender Committee.

Tender Committee: A formal committee responsible for developing and issuing the Request for Qualifications and the Request for Tender.

Tender Envelopes Opening Committee: The committee responsible for opening and recording Tender Offer envelopes. It is chaired by a senior official and composed of a legal member, a technical member, a financial member, and the Director of the Purchasing Department or his delegate. The committee opens the technical response envelopes on the day of the deadline for submittals. After the Tender Envelopes Opening Committee opens and records the technical response envelopes, it submits them to the Decision Committee. After the technical review is completed the Tender Envelopes Opening Committee reconvenes, opens, reports, and records the contents of the financial response envelopes for the technically acceptable offers. Once the financial response envelopes have been opened, one or more responsible officials verify the financial offers. They are then submitted to the Decision Committee.

Tender Evaluation Committee (TEC): The Decision Committee and the Tender Envelopes Opening Committee.

Tender Offer (TO): The final form of a Bidder’s proposals on how it will meet the requirements of the Request for Tender, including technical and financial details.

Teratogenic: A Teratogen is a chemical which may cause genetic mutations or malformations in the developing fetus.

Tipping Fee: The fee charged for accepting waste at a Transfer Station, Incinerator, Material Recovery Facility, Landfill, etc.

Tipping Floor: The unloading area at waste transfer and processing facilities designated for unloading of waste carrying vehicles.

Toxicity Characteristic Leaching Procedure (TCLP): A laboratory testing procedure that is intended to determine the amount of a particular element that leaches from a sample placed in an acidic solution. Often use to determine if a material is a Hazardous Waste.

Toxic Waste: See Hazardous Waste.

Transfer: Supplemental transportation systems employed to reduce waste hauling costs by using semi-trailers, railroad cars, or barges to haul from a transfer station within a planning area to one or more distant solid waste management facilities. The act of transfer includes unloading collection vehicles at the transfer station, loading solid waste for the transfer station into the transfer vehicles, and hauling the solid waste to the distant facility.

Transfer Station (TS): A facility engineered and used as an intermediate staging area for Solid Waste processing or disposal. After collection, the Solid Waste is deposited at a Transfer Station where it is then loaded onto appropriate vehicles to be hauled to a Processing or Disposal Facility.

Transfer Trailer: A transportation unit consisting of a semi-tractor and a trailer which is used for the hauling of large volumes of waste from a transfer station to a designated solid waste processing or disposal facility.

Transfer Vehicle: A transportation unit which is used for the hauling of waste from a transfer station to a designated solid waste processing or disposal facility.

Trash: Worthless or discarded material or objects, Refuse, or Rubbish. A generic term for, and component of, Solid Waste.

Trommel: A rotating perforated cylinder used to separate materials by particle size. Trommels are used in the pre-processing stage of compost feedstock preparation to sort larger particles, usually over 50 to 80 millimeters (mm) in size from the smaller particles. Trommels are also used in the post processing stage of composting to remove non-organic or other undesirable particles from the finished compost product.

Turned Windrow Composting: A composting process in which organic feedstock is placed in elongated windrows that are frequently mixed (or turned) to optimize the environmental conditions that increase the natural decomposition process (composting).

Unacceptable Waste: Hazardous wastes, radioactive waste, chemical liquids, untreated medical waste, and any other waste designated as not acceptable at waste transfer, processing, and/or disposal facilities.

Unsaturated Zone: The soil layer under the surface of the ground but above the groundwater (saturated zone) where the pores between the soil particles are primarily filled with air.

Up-Gradient: A location on or under the surface of the ground from which surface water or groundwater is flowing toward a point of evaluation.

Upper Explosive Limit (UEL): The maximum concentration of a combustible or explosive gas in air, that can cause a fire or explosion as a result of contact with an ignition source.

User Fees: Fees directly billed to individual service customers for solid waste management and public facility cleaning services.

Vadose Zone: See Unsaturated Zone.

Variable Rate Tariff: A fee charged waste producers that varies based on the volume or weight of the waste collected. Useful for large waste producers such as hotels, restaurants, and factories.

Vector: Organism such as bird, rodents, livestock, feral animals, and insects that can transmit disease through contact with solid waste.

Waste: Anything that is discarded, useless, or unwanted; opposite of conserve, as in “to waste”.

Waste Audit: A controlled process whereby all of the waste generated by a particular facility or Planning Area is surveyed and identified. Often used to determine if there are portions of the Waste Stream that can be reduced, reused, recycled, or otherwise diverted from disposal for the primary purposes of cutting costs and/or complying with regulatory requirements. Also used to determine if there are hazardous components of the Waste Stream that need separate management. Waste Audits conducted at industrial facilities often facilitate the identification of waste materials appropriate for inclusion in Waste Exchange Programs.

Waste Characterization Study: A controlled process whereby the waste generated within a Planning Area or by a particular facility is surveyed to assess its’ composition. Typically used to determine what portions of the Waste Stream can effectively be reduced, reused, recycled, or otherwise diverted from disposal. Also used to determine if the Waste Stream can support a Waste Incineration Facility.

Waste Collection Vehicle: Any mobile piece of equipment, motorized or not, used by the Contractor on the public streets for the purpose of accepting, compacting, storing or transporting MSW, Bulky Waste, Medical Waste, Industrial Waste, C&D, etc. in any phase of the collection process from the point of collection to the point of transfer, processing or disposal.

Waste Disposal: The process of isolating waste in a controlled Landfill where its potential environmental and health and safety effects are mitigated.

Waste Diversion: To divert waste, in accordance with all applicable governorate and national regulations, from disposal at Landfills or transformation facilities through source reduction, reuse, recycling, or composting.

Waste Diversion Rate: Is defined by the following formula:
$$(\text{Tons of waste collected} - \text{Tons of waste disposed}) / (\text{Tons of waste collected})$$

Waste Exchange: An organization that arranges for wastes from various generators or industries to be recycled or reused by others.

Waste Generator: An individual or a business whose act or process produces solid waste, or whose act first causes solid waste to become subject of regulation.

Waste Pooling Site (WPS): A waste collection site that services many residences or business establishments. For example, instead of setting trash outside his door or building, a resident would need to place his trash in a disposal bin at a Waste Pooling Site located near his residence.

Waste Reduction: The process of reducing the volume of the waste stream. This can be accomplished by recycling or by encouraging waste producers to reduce the quantity of waste generated.

Waste Screening: Refers to a program of monitoring and inspecting incoming waste loads at a Solid Waste Management Facility in order to screen out wastes that are prohibited or otherwise unacceptable.

Waste Service Provider: Any organization or company willing to provide one or more services for Solid Waste Management.

Waste Stream: A term describing the total flow of solid wastes from Dwelling Units, commercial businesses, institutions, and manufacturing plants that must be managed, or any segment thereof, such as the “residential waste stream”.

Waste-to-Energy (WTE): The process of converting waste to productive energy, usually electricity. Normally accomplished through high temperature combustion of waste. Refers to the controlled combustion of Solid Waste in modern furnaces, with state-of-the-art pollution controls, and the recovery of energy in the form of steam or electricity.

White Goods: Discarded household appliances such as refrigerators, washing machines, dishwashers, etc.

Windrow: An elongated stockpile of material. In composting a windrow is an elongated stockpile of organic feedstock.

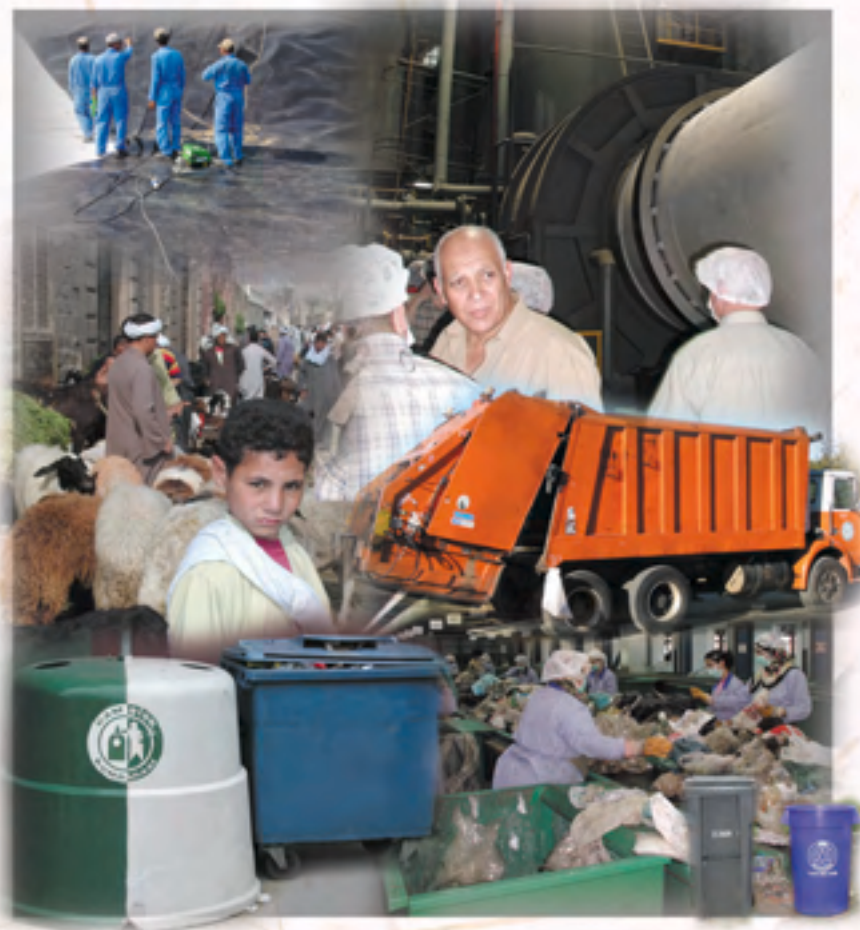
Work Face: See Working Face.

Working Face: The Working Face is the length and width of the row in which the waste is being deposited during any particular day.

Yard Waste: See Green Waste.

Zero Waste: Refers to efforts to reduce Solid Waste generation waste to zero, or as close to zero as possible, by minimizing excess consumption and maximizing the recovery of wastes through recycling and composting.

Solid Waste Management Privatization Procedural Manual



Ministry of State for Environmental Affairs



U.S. Agency for International Development



Egyptian Environmental Policy Program